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**Sent:** 3/28/2012 8:32:59 AM  
**To:** Jennifer Gundersen/ESC/R3/USEPA/US@EPA  
**CC:**  
**Subject:** Re: RRP

Would the work focus on the topic covered in the CRADA concept??? Not a commitment to what is described, just to give the RSC members an idea of what you are considering?

The Region 3 Laboratory at Ft. Meade has recently provided analytical support for ORD and Region 8 concerning potential drinking water impacts related to natural gas extraction associated with the ORD hydraulic fracking study at the Pavillion, Wyoming site. Recently, the Region 3 laboratory has also been providing extensive analytical support associated with the Dimock site in Pennsylvania. Analysis of glycol ethers, important potential indicators of hydraulic fracking impacts on drinking water, has been an important component of this analytical support. Presently, there is no fully validated standard method and the one being used is a modification, developed by the R3 chemist leading the work on the glycol ethers, based upon an internally developed protocol. This week, Region 3 received requests to disseminate the draft procedures to Chesapeake Energy and Cabot Oil and Gas, companies involved with the ORD studies at the Pavillion and Dimock sites, for the glycol ether method being used. The method may be shared with the companies' contracted laboratory, Test America, their primary contract laboratory for chemical analytical work. Region 3 and ORD are concerned about their using this method, without close collaboration with the Agency to validate the method, achieving desired detection levels, and other issues that may be associated with the use of this method. Region 3/ORD feel a collaborative validation effort with the industry and/or their analytical laboratory, should be considered, and may be the most effective way to bring the method to the appropriate validation level in support of the efforts at Pavillion, Dimock and future monitoring efforts, associated with hydraulic fracking/natural gas extraction.

A collaboration with ORD is needed to further validate this method through an inter-laboratory study and subsequently publish a standard method. In view of the present demanding workload and immediate need for results, Region 3 and ORD are proposing to simultaneously validate the method with a two phase approach.

Phase I – Develop a cross-Agency validation with EPA laboratories: ORD Las Vegas (possibly NHEERL, AED, Narragansett and NRMRL, Ada), Region 3 (possibly Regions 5 and 6). This would be initiated immediately, potentially with contractor support provided through the ORD research plan.

Phase II – ORD and Region 3 would invite Test America and possibly the energy companies to consider a Cooperative Research and Development Agreement (CRADA) to collaboratively further validate the method and seek desired detection levels. Further validation of methods for other chemicals which may be good indicators of potential hydraulic fracturing impacts, would also be considered. A CRADA would offer an open, objective, collaborative research effort, which would benefit both parties, under tightly controlled, well defined goals and obligations. If Test America (and possibly Constellation and Cabot) do not express interest in the collaboration, at least EPA would have demonstrated an attempt to seek such collaboration, if concerns come up in future discussions about the validity of the method.

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